

**REMARKS**

By this amendment, claims 8, 14, 19 and 24 have been amended. Accordingly, claims 8-24 remain pending in this application. Favorable reconsideration of this application, as presently amended, and in light of the following discussion, is respectfully requested.

**Claims 8, 10-14, 16-19 and 21-24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Budelman (US Patent No. 6,244,331), in view of Hsieh (US Patent No. 5,377,745).**

Applicants have amended claims 8, 14, 19 and 24 in accordance with the suggestions contained in the Interview Summary of July 8, 2005. Therein, the Examiner acknowledged that independent claims of the present application are directed to possibly allowable subject matter by adding additional points of clarification.

Regarding claims 8, 19 and 24, it is noted that there is a distance between the rotary shaft and the second cooling fins (lower portion) so that the rotary shaft is positioned away from the shaft. Keeping a distance between the rotary shaft and the second cooling fins can prevent conducting heat generating from the motor to the heat sink, thus enhancing heat-dissipating efficiency of the heat sink (page 7, line 23-25).

Budelman discloses a thermal dissipation device that provides an axle 532 disposed in the space 418. However, Budelman does not disclose corresponded second cooling fins in the citation.

In addition, Hsieh discloses a cooling device for central processing unit that provides a plurality of second fins 23 for mounting the fan means 10 in the space above the second fins 23 (column 2, lines 24-27), but Hsieh does not teach that the axle 21 is positioned away from the second fins 23 with a distance between the fins 23 and the axle 21. That is, the axle 21 is positioned so close to the second fins 23 that there is no enough space for heat to escape.

Since Budelman and Hsieh do not teach to position the shaft away from the lower portion with a distance between the rotary shaft and the second cooling fins, there is no desirability of making the combination of the thermal dissipation device of Budelman and the cooling device for central processing unit of Hsieh. That is, there is no motivation to combine Budelman with Hsieh. Applicants therefore submit that Claims 8, 19 and 24 are patentable over Budelman in view of Hsieh.

As stated above, Applicants respectfully submit that claims 8, 14 and 19 are patentable over Budelman in view of Hsieh. Claims 9-13, 15-18 and 20-23 are also patentable at least by virtue of their dependence from claims 8, 14 and 19.

Regarding claim 14, the cooling device further comprises a cover. The cover is connected to the heat sink and has corners directly contacted to the first cooling fins. Since Budelman and Hsieh do not teach to comprise a cover and there is no teaching supported by any references that the cover has corners directly contacted to the first cooling fins, Applicants submit that claim 14 is also patentable over Budelman in view of Hsieh.

**Claims 9, 15 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Budelman in view of Miyahara, et al. (hereinafter "Miyahara", US Patent No. 5,940,268).**

Applicants submit that since claims 8, 14, and 19 are patentable for the above-stated reasons, Claims 9, 15, and 20 are also patentable at least by virtue of their dependence from claims 8, 14 and 19.

As shown in Figs. 4 and 5 of Miyahara, different air flow directions are presented. In detail, the inlet 20 is positioned on one side of the second cover 19, so that airflow flows into the heat sink substrate 12 in a radial direction. Also, the outlet 14 is positioned on the side of the heat sink substrate 12, so that airflow flows out of the heat sink substrate 12 in a radial direction. Thus, the air flows in radially, and out radially.

In comparison, the centrifugal cooling device of the present application has air intake axially but air flows out in a radial direction, thus creating greater air pressure to dissipate heat.

### Conclusions

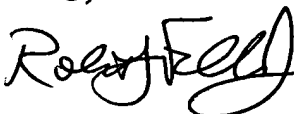
In view of the amendments to the claims and the remarks set forth above distinguishing the present Application from the cited references, Applicants submit that the Examiner's rejections have been overcome. It is therefore respectfully requested that the Examiner withdraw the rejections and allow the present claims.

If, for any reason, it is felt that this application is not now in condition for allowance, the Examiner is requested to contact the undersigned at the telephone number indicated below to arrange for an interview to expedite the disposition of this case.

In the event that this paper is not timely filed, Applicants respectfully petition for an appropriate extension of time. The fees for such an extension or any other fees which may be due with respect to this paper, may be charged to Deposit Account No. 50-2394.

Respectfully submitted,

*IPS, Inc.*



Robert J. Forsell, Jr.  
Reg. No. 51,693

Customer No. **34003**  
5717 Colfax Avenue  
Alexandria, VA 22311  
Tel: (703) 379-9625  
Fax: (703) 379-9628

RJF/km